04- 4-13;13:44 ; 智士写真フィルム(株)知的財産的(足精) APR-12-2004 MON 01:59 PN BSKB NGB ; 0485737929 FAX NO. 7032058050

P. 02

APR 1 2004 ST

PATENT 0649-0710P

IN THE U.S. PATENT AND TRADEMARK OFFICE

Applicant:

Hidekazu SAKAI et al.

Conf No.:

3756

Appl. No.:

09/468,538

Group No.:

1752

Filed:

December 21, 1999

Examiner:

Walke

For:

SILVER HALIDE COLOR PHOTOGRAPHIC LIGHT-

SENSITIVE MATERIAL FOR MOVIE

DECLARATION UNDER 37 C.F.R. \$ 1.132

Commissioner for Patents P.O. Box 1450 Alexandria, VA 22313-1450

Sir:

- I, Hidekazu Sakai, do hereby declare and state that:
- I graduated from Osaka University, Faculty of Graduate School/ Faculty of Science, Course of Organic Chemistry receiving a Master's degree in March of 1988;
- I have been employed by Fuji Photo Film Co., Ltd., since April of 1988 until the present time;

I have been engaged in research and development on the method for using the organic element for the color photograph at the Ashigara Laboratories of Fuji Photo Film Co., Ltd., from 1988 to the present date;

The following comparative experimentation have been prepared under my supervision:

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P. 03

Application No.: 09/468,538

Comparative Experiments

In the following comparative experiments, samples shown in Table A were prepared strictly in the same manner as in Comparison Experiment A' submitted to the USFTO on December 21, 2001, except that the cyan coupler has been changed. The samples were evaluated for sharpness and white background density in the same manner as in the above-mentioned Comparison Experiment A'.

In combination with the results from Table 2-1" in Comparison Experiment A', the following Table A was prepared.

The white background densities displayed in Table A utilize Sample no. 201' as the reference. Also, the alteration of the coating amount of the 4th layer was required to achieve the same oyan density for the same exposure quantity in the individual samples. D' is a sample involved in Comparison Experiment A'.

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FAX NO. 7032058050

P. 04

Application No.: 09/468,538

Table A

Sample No.	Type of solid dye fine	Cyan Coupler of the Present Invention			Sharp	White Back- ground	Note	•
	dispersion of the 1st layer	Турө	Amount Used (mol %)	Coated Amount of the 4th Layer (%)		Den- sity		
201'	None	None (only C-3 of Fujita)	-	110	16	-	c	
Comp.	ים י	None (only C-3 of Fujita)	-	110	20	0.04	C	
Comp.	None	41 of Sakai	70	69	24	0.00	C	
205'	״מ	41 of Sakai	70	69	39	-0.01	Ī	
Comp.	None	(1) of present app.	70	69	28	0.01	С	H.S. 4/13/2004
20C	D'	(1) of present app.	70	69	40	-0.04	I	
Comp.	None	(2) of present app.	70	75	25	0.00	C	

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P. 05

Application No.: 09/468,538

Sample No.	Type of solid dye fine	Cyan (coupler o	f the tion	Sharp ness	White Back- ground	Note
	dispersion of the 1st layer	Type	Amount Used (mol %)	Coated Amount of the 4th Layer (%)		Den- sity	
200	D'	(2) of present app.	70	75	38	-0.01	Ĭ
Comp.	None	(25) of present app.	70	73	23	0.00	c
20E	D'	(25) of present app.	70	73	39	-0.04	Í

Note: C = Comparative Example

I = Present Invention

According to the above results, Samples 20C, 20D and 20E, all belonging to the present invention, exhibit both high sharpness values (ranging from 38 to 40) and excellent white background density (as low as -0.01 to -0.04). These results are advantageous superior to the results achieved by the Comparative Sample A', which is a combination of publicly known techniques. A review of the results reveals that Comparative Sample A', in which the solid fine particle dispersion is used in conjunction with Sample 201' using a conventional phenol-based coupler, exhibits

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Application No.: 09/468,538

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enhanced sharpness. However, the degree of enhancement is increases only 4, and the white background density thereases showing H.S. 4/B/2004 performance deterioration.

In comparison to Sample 201', Samples 205', 20C, 20D and 20E of the present invention exhibit noticeable enhancements of sharpness as large as 23, 24, 22 and 23, respectively. This increase is not accompanied by the increase (a disadvantageous result) of white background density.

Additionally, by comparing the differences caused by the type of coupler for the instances where the solid fine particle dispersion of a dye is present and absent from the first layer to be combined in the present application, additional results are obtained.

That is, by comparing Sample 205' of the present invention with Comparative Sample B' (Comp. B'), Sample 205' of the present invention is superior in sharpness by a value of 15.

Also, by comparing Sample 20C of the present invention with Comparative Sample C (Comp. C), Sample 20C of the present invention is superior in sharpness by a value of 12.

Further, by comparing Sample 20D of the present invention with Comparative Sample D (Comp. D), Sample 20D

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of the present invention is superior in sharpness by a value of 13.

Also, by comparing Sample 208 of the present invention with Comparative Sample E (Comp. E), Sample 20E of the present invention is superior in sharpness by a value of 16.

In contrast to these results, the degree of sharpness improvement for Comparative Sample A' relative to Sample 201' (in which a conventional phenol-based coupler is used) is only 4. Accordingly, the properties achieved by the present invention far exceed any expectation, which might be estimated from a conventional phenol-based coupler.

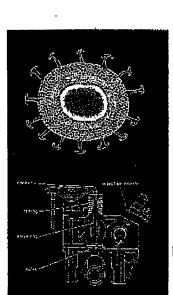
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By Hidekasu Sakai

Hidekasu Sakai

Date Opril 13, 2004

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McGraw-Hill Dictionary of Scientific and Technical Terms

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In addition, material has been drawn from the following references: R. E. Huschke, Glossary of Meteorology, American Meteorological Society, 1959; U.S. Air Force Clossary of Standardized Terms, AF Manual 11-1, vol. 1, 1972; Communications-Electronics Terminology, AF Manual 11-1, vol. 3, 1970; W. H. Allen, ed., Dictionary of Technical Terms for Aerospace Use, 1st ed., National Aeronautics and Space Administration, 1965; J. M. Gilliland, Solar-Terrestrial Physics: A Glossary of Terms and Abbreviations, Royal Aircraft Establishment Technical Report 67158, 1967; Glossary of Air Traffic Control Terms, Federal Aviation Agency; A Glossary of Range Terminology, White Sands Missile Range, New Mexico, National Bureau of Standards, AD 467-424; A DOD Glossary of Mapping, Charting and Geodesic Terms, 1st ed., Department of Defense, 1967; P. W. Thrush, comp. and ed., A Dictionary of Mining, Mineral, and Related Terms, Bureau of Mines. 1968; Nuclear Terms: A Glossary, 2d ed., Atomic Energy Commission; F. Casey, ed., Compilation of Terms in Information Sciences Technology, Federal Council for Science and Technology, 1970; Glossary of Stinfo Terminology, Office of Aerospace Research, U.S. Air Force, 1963; Naval Dictionary of Electronic, Technical, and Imperative Terms, Bureau of Naval Personnel, 1962; ADP Glossary, Department of the Navy, NAVSO P-3097.

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ADAMANTANE

Structure of ademantane showing indigeness carbon labeled 1 and alternate position for substitution at carbon 2.

22

acute lymphocytic leukemia adaptive control

04- 4- 8: 9:59 ;富士写真フィルム(株)知的財産的(足柄)

by rapid onset and progress, with anemia and hemmorhagic. manifestations; immature forms of leukocytes are predomi-

acute lymphocytic teukemia [MED] A severe blood disorder in which abnormal leukocytes are identified as immature forms of lymphocytes. Also known as lymphoblastic leuke-

acute monocrite toukemia [MED] A severe blood disorder in which abnormal leukocytes are identified as immature forms of monocytes. Also known as monoblastic leukemia.

acute necrotizing hemorrhagic encephalocayelitis [MED] A sudden, severe central nervous system disease with variable symptoms; pathology includes hemorrhages and necrosis of

acute nonsuppurative hopatitis. See interstitial hepatitis.

acute radiation syndrome [amp] A complex of symptoms
involving the intestinal tract, blood-forming organs, and skin

following whole-body irradiation. scute respiratory disease [MED] Severe adenovirus infection of the respiratory tract characterized by fever, sore throat, and cough.

scute rhamatic tever [new] A severe form of the disease.
acute minitis [sex) Inflammation of the nasal mucous membrane due to either infection or allersy.

actute toxic encephalopathy [NED] A severe childhood symdrome characterized by sudden onset of come or stupor, fever, convulsions, and impaired respiratory and cardiovascular functioning.

neute triangle (MATH) A triangle each of whose angles is less than 90*.

acute tubular necrosis Ser lower nephron nephrosis acute yellow atrophy [MED] Rapid lives destruction following viral hepatitis, toxic chemicals, or other agents.

acutiletiste [sor] Having sharply pointed leaves. scutilobate [BOT] Having sharply pointed lobes.

[BOT] Having flowers arranged in a spiral instead of a whori. [MATH] 1. A transformation on a set to itself for which no nonzero power leaves an element fixed. 2. A chain complex all of whose homology groups are trivial. [77173]
Continually varying without a regularly repeated pattern. acyclic compound [ORO CHEM] A chemical compound with an open-chain molecular structure rather than a ring-shaped

structure; for example, the alkane series.

acquite teeding [ADP] A method employed by alphanumeric readers in which the trailing edge or some other document characteristic is used to activate the feeding of the succeeding document.

acyclic machine See homopolar generator. scyclic motion. See irrotational flow.

acyl [ORO CHEM] A radical formed from an organic said by removal of a hydroxyl group; the general formula is RCO, where R may be aliphatic, alicyclic, or aromatic.

LONG CHEMI Any process (with the compaign of the Friedel-Crafts method) whereby the anyl group is incorporated into a molecule by substitution.

acyl carrier protoin [BIOCHEM] A protein in fatty acid synthesis that picks up accyll and malonyl groups from acctyl coenzyme A and malonyl coenzyme A and links them by condensation to form β-keto acid acyl carrier protein, releasing carbon dioxide and the sulfhydryl form of acyl carrier protein. Abbreviated ACP.

anyl exchange See unidolysis.

acyt halide [One CHEM] One of a large group of organic substances containing the halocarbonyl group; for example, acyl fluoride.

acylein [one came] An organic compound that may be synthesized by condensation of aldehydes; an example is benzoin, C.H., COCHOHC, H.s.

tolo condensation [one crimic] The reaction of an aliphatic ester with metallic sodium to form interspediates converted by hydrolysis into aliphatic a-hydroxyketones called acyloins.

AD See average deviation

ADA See air defense artillery.

adactylous [xep] Lacking fingers and toes

adalort [GEOPHYS] An advance alort issued by a regional

warning center to give prompt warning of a change in solar activity.

adamentane [ORG CHIN4] A CutH16 alicyclic hydrocarbon whose structure has the same arrange pent of carbon atoms as does the basic unit of the diamond lattice.

adamentine drill [MECH ENG] A core drill with hardened steel shot pellets that revolve under the rim of the rotating tube; employed in rotary drilling in very hard ground. adamentine spar [honeral] A silky brown variety of corun-

ademantinoma Ser ameloblastoma

adembulacted [INV 200] Lying adjacent to the ambulactum. See quartz monzonit

dentite [MINERAL] Znx(AsOx)(OH) A colorless, white, or vellow mineral consisting of basic zine arsenate, crystallizing in the orthorhombic system; hardness is 3.5 on Mohs sculu, and specific gravity is 4.34-4.35.

Adam's apple [ANAT] Common name for the ventral promi-nence of the laryou formed by the thyroid cartilage.

Adams-Bashtorth process [MATH] A method of numerically integrating a differential equation of the form (dy/dx) f(x,y) that uses one of Gregory's interpolation formulas to extrand f.

damaile [ORO CHEM] CoH4.NH-CoH4.AsCl A yellow crystalline arsenical; used in leather tanning and in warfare and riot control to produce skin and eye irritation, chest distress, and nauses. U.S. army code is DM. Also known as diphenylaminochlorursine; phenarazine chloride. [MIN-ERALI Grounish-black mica.

(ENG) A conditioning material added to drilling mud to obtain satisfactory cores and samples of formations, adapartural [DIV 200] Near the apertura, specifically of a conch.

adapted [nor] Near or toward the apex or tip.
adaptability test [ORD] A test to ascertain the adaptability of a standardized item or equipment to a particular unit or organization.

adaptation [GEN] The occurrence of genetic changes in a population or species as the result of natural selection so that it adjusts to new or altered environmental conditions. [PHYsto] The occurrence of physiological changes in an individual exposed to changed conditions; for example, tunning of the skin in sunshine, or increased red blood cell counts at high altitudes.

adaptation brightness See adaptation luminance adaptation illuminance See adaptation luminance, adaptation luminance.

edeptation luminance [cornet] The average luminance, or brightness, of objects and surfaces in the immediate vicinity of an observer estimating the visual range. Also known as adaptation brightness; adaptation illuminance: adaptation level; brightness level; field brightness; field luminance.

deptation syndrome [MED] Endocrine-mediated stress reaction of the body in response to systemic injury; involves an initial stage of shock, followed by resistance or adaptation

and then healing or exhaustion.

adapter [ane] A device which converts bits of information received serially into parallel bit form for use in the inquiry buffer unit. [280] A device used to make electrical or mechanical connections between items not originally intended for use together. [MST] A connecting piece, usually made of firectay, between a horizontal zinc retort and the condenser in which the molten zinc collects. (OFTICS) An attachment to a camera that permits its use in a manner for which it was not designed.

schapter skirt [ARRO 1990] A flange or extension of a space vehicle that provides a ready means for fitting some object to a stage of section.

(m.sc) A transformer designed to supply a single electric lappe; its primary terminals are designed to fit into an ordinary lampholder, its secondary terminals into a lamphoider of a low-volume lamp.

adaptive behavior (raycil) Any behavior that helps the organism adjust to its environment

adaptive colities See invitable colon.
adaptive control [CONTSYS] A control method in which one or more parameters are sensed and used to vary the feedback